up or proved futile resulting into of infructuous expenditure; and

(b) if so, the number and details of such projects given up or proved futile during the past five years and the infructuous expenditure involved in regard thereto ?

THE MINISTER OF STATE IN THE MINISTRY OF DEFENCE (SHRI MALLIKARJUN) : (a) As any research & development activity has certain inherent risks particularly in a dynamic environment a few weapon projects undertaken by Defence Research & Development Organisation for developing import substitutes have been short closed for various reasons viz. changes in threat perception and warfare scenario, long development time, high production cost of indigenously developed items etc. However the expenditure incurred on such projects is not infructuous. The expertise gained and infrastructural facilities set up under such projects are directly useful to future projects undertaken in these areas.

(b) During past five years, six weapon projects for developing import substitutes have been short closed or not pursued for production. These projects and expenditure incurred till closure, which was not infructuous, are as under :—

(i) Development of a rocket : Rs. 28·92 lakhs.

(ii) Development of a bomb : Rs. 3·02 crores.

(iii) Development of an illuminating ammunition : Rs. 18·31 lakhs.

(iv) Development of a Gun : Rs. 66·01 lakhs.

(v) Development of practice-head for a weapon : Rs. 79·70 lakhs.

(vi) Development work for conversion of guidance system of a weapon : Rs. 52·32 lakhs.

Production of equipment for satellite based navigation system

2163. SHRI SURESH KALMADI : Will the PRIME MINISTER be pleased to state :

(a) whether it is a fact that Government propose to develop and produce all equipments needed for the satellite based navigation system for the aviation sector, both civilian and military purposes;

(b) if so, what is the total cost involved; and

(c) when the proposal is likely to be implemented ?

THE MINISTER OF STATE IN THE MINISTRY OF SCIENCE & TECHNOLOGY, DEPARTMENT OF ELECTRONICS, DEPARTMENT OF OCEAN DEVELOPMENT AND MINISTER OF STATE IN THE MINISTRY OF PARLIAMENTARY AFFAIRS (SHRI P. R. KUMARMANGALAM) : (a) As per the agreement of International Civil Aviation Organisation, for switchover from conventional Communication, Navigation and Surveillance (CNS) System to Satellite based system from 2000, six key technologies have been planned to develop for phased implementation.

(b) The development cost is estimated to be Rs. 23 crores.

(c) The development programme was initiated in October, 1992. It will take 3 to 5 years to complete in steps for different items of the system. Thereafter, it will be operationalised in phases as per implementation plan of the International Civil Aviation Organisation.

Status of Colour Television Industry

2164. SHRI S. AUSTIN : Will the PRIME MINISTER be pleased to state :

(a) the status of Colour Television Industry in the country;

(b) the production by each colour television manufacturer alongwith brand name and the quantity produced by each of them during 1992;

(c) the multinational companies approved for manufacture of colour television and the annual production by each of them; and

(d) the steps taken by Government to boost indigenous television industry so that it can compete with multinational television companies ?

THE MINISTER OF STATE IN THE MINISTRY OF SCIENCE & TECHNOLOGY, DEPARTMENT OF ELECTRONICS, DEPARTMENT OF OCEAN DEVELOPMENT AND MINISTER OF STATE IN THE MINISTRY OF PARLIAMENTARY AFFAIRS (SHRI P. R. KUMARMANGALAM) : (a) The production of Colour Television in the country during last 3 years was as follows :

Year	Production
1990	12·0 lakhs no.

1991	8·8 lakhs no.
1992	8·3 lakhs no.

(b) The names of Colour TV (CTV) manufacturing units and the brand names used, alongwith number of CTV sets manufactured by each during the year 1992 as reported to the Department of Electronics are given in the enclosed Statement-I (*See* below).

(c) Kalyani Sharp India Ltd., Pune and Peico Electronics & Electricals Ltd., Calcutta, are the two companies with foreign equity holdings approved for manufacture of television and their production of colour television during the last 2 years was as follows :

Name of the Unit	Production	
	1991	1992
Kalyani Sharp	49,095	49,524
Peico	36,520	38,454

(d) Measures taken/initiated by the Government to give boost to the growth of TV Industry are given in the enclosed Statement-II.

Statement I

List of Colour TV Manufacturers during 1992

	Manufacturer's Name	Brand	Quantit (In Nos
1.	Aritron India Pvt. Ltd., New Delhi	Atari	1
2.	Assam Electronics Dev. Corporation Ltd., Guwahati	Amtron	38
3.	Beltek India Ltd., Noida	Beltek	36
4.	Bijal Electronics Ltd., Gandhinagar		69
5.	BPL Ltd., Bangalore	BPL-India	161,26
6.	BPL Ltd., Palghat	BPL-India	6,06
7.	BPL Sanyo Utilities & Appliance Pvt. Ltd., New Delhi	BPL-India	28,22
8.	Calcom Vision Ltd., New Delhi		4,27
9.	Cauvery Electronics Ltd., Bombay	Bush	7,22
10.	Central Electronics Ltd., Sahibabad	CEL	97
11.	Dom Bell Investments Pvt. Ltd., Noida	Videocon	31,5(
12.	Dynamic Electronics Ltd., Bangalore	BPL-India	17,4
13.	Dynavision Ltd., Madras	Dyanora	4,0
14.	Electronics Corporation of India Ltd., Hyderabad	ECIL	14,6(
15.	Goa Electronics Ltd., Mapusa	GEL/EC	3
16.	Hendez Electronics Ltd., Palghat	Hendez	2
17.	Infini Electronics Pvt. Ltd., Hyderabad	ET&T	
18.	Instavision Systems (I) Pvt. Ltd., Ahmedabad		
19.	Initron Times Ltd., Bhubaneshwar	Initron	
20.	Jupiter Radios (Regd.), New Delhi	Texla	8,1(
21.	Kalyani Sharp India Ltd., Pune	Optonica	49,5
22.	Kashmir Electronics Television Factory., Srinagar		
23.	Kejriwal Electronics Ltd., Calcutta	Oscar	1,0
24.	Kerala State Electronics Dev. Corpn. Ltd., Calicut	Keltron	1,5
25.	Kinetic Engg. Ltd., Pune		5
26.	Konark Television Ltd., Bhubaneshwar	Konark	8
27.	Kumaon Television Pvt. Ltd., Bhimtal	Uptron	
28.	Mira Electronics Ltd., Bombay	Onida	96,4
29.	Monita Electronics Ltd., New Delhi	Onida	41,8
30.	Onida Saka Ltd., New Delhi	Onida	3,3
31.	Onida Savak Ltd., Noida	Onida	6,8

32.	Panorama Electronics Pvt., Ltd., Calcutta	Panorama	467
33.	Peico Electronics & Electricals Ltd., Calcutta	Philips	38,454
34.	Quaser Electronics Pvt. Ltd., Bombay	Blue Diamond	2
35.	Ra-Veitronics, Madras	Sakthi	193
36.	Raletronics Ltd., Bangalore	Bush	2,300
37.	Rina Electronics, Madras		219
38.	Salora International Ltd., Kashipur	Salora	368
39.	Salora International Ltd., New Delhi	Salora	8,090
40.	Sidkel Television Ltd., Manjeri	Keltron	28
41.	Sohan Finance Pvt. Ltd., Calcutta	Videocon	7,000
42.	Solidare India Ltd., Madras	Solidaire	16,330
43.	Sonodyne Television Co. Ltd., Calcutta	Sonodyne	47
44.	Super Cassette Industries Ltd., Noida	T-Series	1,897
45.	Teletronix Ltd., Nainital		116
46.	Television & Components Ltd., Gandhinagar	Crown	21,919
47.	Texla Electronics, Ludhiana	Texla	19,445
48.	Tolaram Electronics Pvt. Ltd., Bombay		200
49.	United Diamonds Ltd., Bhopal		26
50.	Uptron India Ltd., Jaunpur	Uptron	6,328
51.	Uptron India Ltd., Lucknow	Uptron	5,687
52.	Video Electronics Ltd., Sahibabad	Crown	2,644
53.	Videocon, New Delhi	Videocon	71,885
54.	Videocon International Ltd., Aurangabad	Videocon	39,748
55.	Videocon International Ltd., Gandhinagar	Videocon	19,936
56.	Webel Nicco Electronics Ltd., Calcutta	Webel Nicco	896
57.	Weston Electronics Ltd., New Delhi	Weston	41,396

Statement II

Measures taken/initiated by the Government to give boost to the growth of TV Industry

I. General policy and procedural measures :

Licensing :

(a) The entire electronics industry has been exempted from the locational limitations imposed on other industries.

(b) Licensing has been abolished for all industrial undertakings including companies covered under Monopolies and Restrictive Trade Practices (MRTP) and Foreign Exchange Regulation Act (FERA) for B&W TV sets.

(c) The system of phased manufacturing programme (PMP) has been abolished.

(d) Development of small scale industry is being encouraged. Approvals/registrations have been totally decentralised to the level of State Directorates of Industries. Investment limit for this sector has been revised upwards to Rs. 60 lakhs and that for ancillary units, to Rs. 75 lakhs.

(e) Existing units are permitted to manufacture any article without additional investment under broad-banding subject to certain conditions.

(f) Amendment to the MRTP Act has removed the threshold limit of assets in respect of MRTP companies.

(g) Government decided to discontinue with the imposition of the additional conditions in Letter of Intent/Industrial Licence in the case of Colour TV Industry.

Import and Export Policies :

(a) Access to foreign exchange for the import of capital goods, parts and components required has been provided freely through the system of full convertibility introduced in the Budget 1993-94.

(b) Tools, Dies, Moulds can be imported freely at concessional rate of customs duty.

(c) The Exim Policy allows free import of inputs except a few items covered under the negative list.

(d) The exporter of TV sets are now eligible for import licences to import electronic items covered under the negative list. The value of import licence will be limited to 30% of the FOB value of export realisation.

Fiscal Policies :

— Customs Duty on components other than CPT brought down to a level of 50% (customs duty for CPT brought down to 75%).

— Customs duty on glass parts for CPT brought down to 20%

— Excise duty on 14", 20"/21" CTVs reduced.

— Excise duty on CG and instruments reduced.

Electronics Hardware Technology Parks :

Government has announced the Electronic Hardware Technology Parks Scheme to attract major international electronic companies to establish global scale manufacturing facilities incorporating the latest technology. This will also help Indian enterprises to attain global scales of operations and thereby enhance their product and process quality and international competitiveness.

Velocity of Business :

Action has been initiated for improving the Velocity of Business in the Electronics Industry. It aims at removing procedural bottlenecks pertaining to licensing, customs, infrastructure etc. to speed up the development of Electronics industry.

II. Infrastructure and other facilities :

Applications of Electronics :

(a) For developing awareness of quality, a network of Standardisation, Testing and Quality Control (STQC) Laboratories have been set up. Some of these laboratories are authorised to test and certify for international and national quality standards. This must help in the export of electronic products.

(b) To assure consumers' quality production, B&W TV and CTV Certification Schemes have been introduced.

(c) For exports to "Single European market after 1992", the industry is being offered help and assistance in preparation to meet the ISO 9000 requirements.

(d) Technology development projects have been initiated by the Technology Development Council, with a view to promote innovation, product design and development which are all basic for the growth of a healthy industry.

(e) Electronics Research and Development Centres have been set up to carry out R&D in well identified areas which is also a measures for developing self-reliant industrial base.

(f) A number of Centres for Electronic Design and Technology (CEDTs) have been set up in various parts of the country with the basic objective of imparting training with emphasis on aspects such as design, product development, technology and manufacturing processes with due regard to quality control, reliability, maintenance etc.

(g) Six months Service Technician Training Programme for repair and maintenance of common consumer electronic products has been initiated in 101 ITIs.

Addition of New Mission to the Series of Technology Missions

2165. DR. SHRIKANT RAMCHANDRA JICHKAR : Will the PRIME MINISTER be pleased to state :

(a) whether any new mission has been added to the series of Technology Missions launched by the Department of Electronics;

(b) what has been the concrete outcome of the commercialising of indigenous technologies;

(c) what are the frontier technologies which are emerging recently; and

(d) whether it is necessary to launch a few more technology missions in view of (c) above ?

THE MINISTER OF STATE IN THE MINISTRY OF SCIENCE & TECHNOLOGY, DEPARTMENT OF ELECTRONICS, DEPARTMENT OF OCEAN DEVELOPMENT AND MINISTER OF STATE IN THE MINISTRY OF PARLIAMENTARY AFFAIRS (SHRI P. R. KUMARAMANGALAM) : (a) No, Sir.

(b) About 80 technologies/products have been developed through efforts of the Department of Electronics; most of which have already been transferred to industry for commercialisation.

(c) and (d) Emergence of frontier technologies is a continuous process. Some of the areas of frontier technologies are : Advanced Materials, Advanced Semiconductor Devices, Artificial Intelligence, Digital Imaging Technology, Flexible Computer Integrated Manufacturing, Photonics/Optoelectronics High Performance Computing Sensor Technology etc. Of these, four subject areas viz. Advanced